

## ABSTRACT

A connector, applicator and method for mechanically connecting hollow structures, in particular small blood vessels, in order to make an anastomosis. The connector incorporates various features to create a reliable engagement with the vessel walls to make a good connection thereof. The connector includes knife members to make an arteriotomy in and punch a hole in one of the vessel walls, an expansion portion to cause a large expansion with a minimum profile, and anvil members to reliably bring the staple-like elements to the joining position.

